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ABSTRACT

The New Jersey College Basic Skills Placement Test (NJCBSPT) is designed to measure basic reading, writing, and mathematics skills of students entering New Jersey colleges. The test consists of five sections: Essay, Reading Comprehension, Sentence Sense, Mathematical Computation, and Elementary Algebra. The test is intended to answer the question of whether an incoming student will profit more from placement in the regular first-year English or mathematics program than from placement in courses that the college is offering to prepare students for the regular program. The test is developed by committees made up of New Jersey college faculty, and assisted by high school teachers. The distribution of scores on the NJCBSPT is a consequence of the purpose of the test: the mean raw score tends to be within two standard deviations of the maximum possible raw score. Because the requirements of freshman courses vary from campus to campus, no particular score can serve as the cut-off score; teachers should allow themselves to be guided by their experience in teaching students and by the expectations they have of their particular students. A discussion of the reliability of the test, and served sample score reports are included in this document. (BW)

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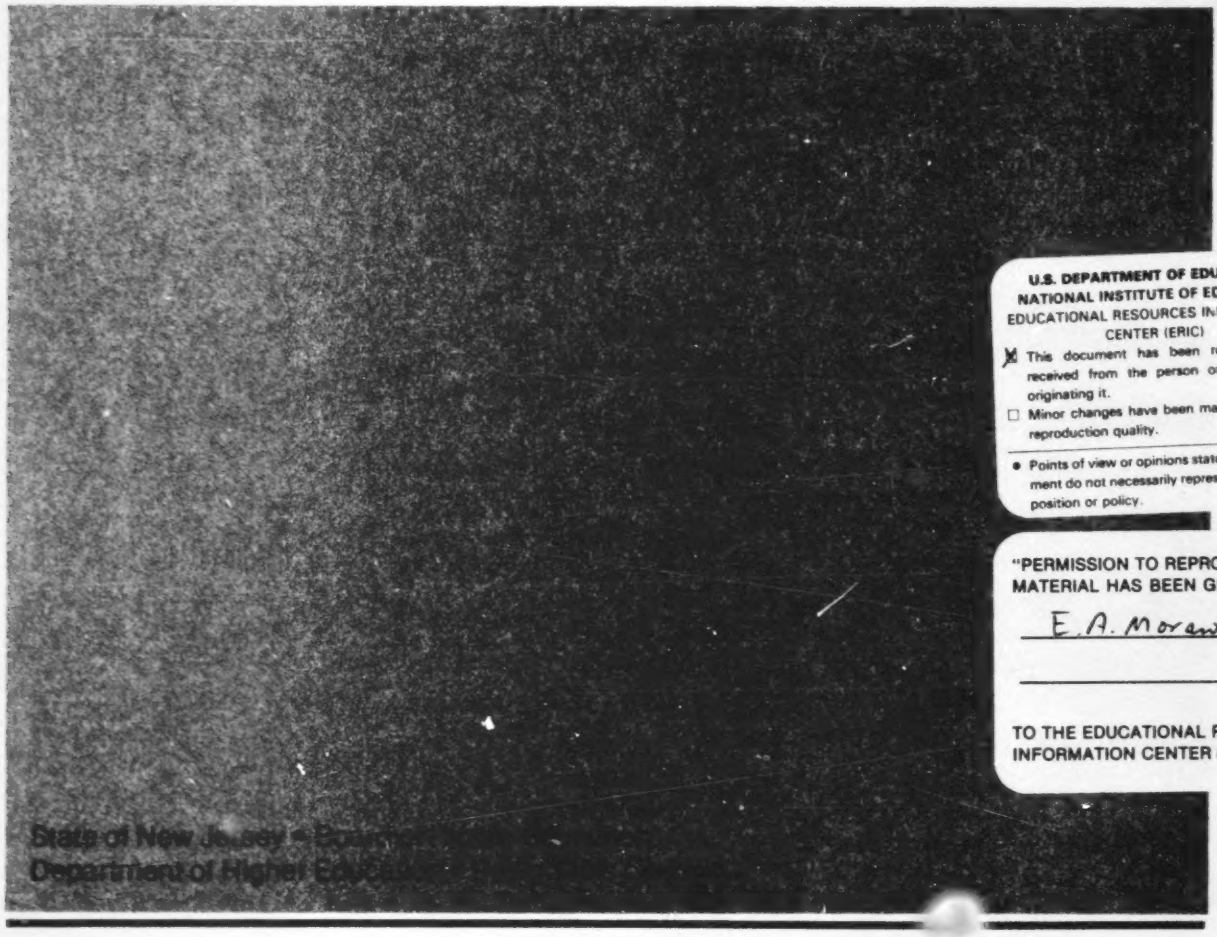
Interpreting Scores on the New Jersey College Basic Skills Placement Test



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THE NATURE AND PURPOSE OF THE TEST

The New Jersey College Basic Skills Placement Test (NJCBSPT) is designed to measure basic reading, writing, and mathematics skills of students entering New Jersey colleges. The test consists of five sections, as follows:

1. Essay
2. Reading Comprehension
3. Sentence Sense
4. Mathematical Computation
5. Elementary Algebra

Except for the 20-minute Essay, each section of the NJCBSPT consists of multiple-choice questions. Reading Comprehension is administered with a 50-minute time limit and Sentence Sense, with a 35-minute time limit. The time allowed for the two mathematics sections is 40 minutes each.

The NJCBSPT is designed to provide information about the proficiency of entering college students in reading, writing, and mathematics. The test is intended to help answer the important question of whether an incoming student will profit more from placement in the regular first-year English or mathematics program than from placement in courses that the college is offering to prepare students for the regular program.

The NJCBSPT is not an intelligence or an aptitude test, nor is it designed to predict college success. (However, it does point out deficiencies in basic skills that may impede college-level performance.) Neither is it an admissions test; in fact, the test is administered only after students have been admitted to the college of their choice. The NJCBSPT is properly considered a placement test. Like any other tool, the NJCBSPT is most effective when it is used for its designated purpose, which is to provide information helpful in placing students in courses appropriate to their reading, writing, and mathematics skills. The later sections of this guide suggest a number of ways that a college may find the NJCBSPT useful as a placement test.

HOW THE TEST IS DEVELOPED

New Jersey college faculty members are very much involved in the development of each form of the NJCBSPT. Faculty members serve on the New Jersey Basic Skills Council, on an Assessment Advisory Committee, and on each of two test development committees, the Mathematics Advisory Committee and the Reading and Writing Advisory Committee. The test development committees specify the content of the test—the knowledge and skills to be measured—and approve all questions used to measure that content. To promote articulation between high schools and colleges, high school teachers have been invited to serve as consultants to each of the test development committees.

Before a new question is made part of the test, it is reviewed by the committee, which may approve it, alter it, or discard it. Some of the questions that pass this first committee review are included as pretest items (trial questions) along with the actual test questions when the test is administered to students in New Jersey colleges. The pretest items do not affect the students' scores, but the students' performance on these questions is analyzed: Did students who score well on the test tend to choose the right answer? Did many students omit the question? Is the question too difficult or too easy for the students? Does the question differentiate students with proficiency from those lacking in proficiency?

Figure 1 shows some examples of the statistical graphs used by the committee in reviewing pretest items. A separate graph is printed for each new question being pretested. The four questions in Figure 1 were tried out for use in the Sentence Sense section of the test. The students have been classified according to their Sentence Sense scores (which do not include the questions being pretested). Each graph shows these scores on the horizontal scale, both as raw scores (RS) and scaled scores (SS). For the students at each score level, the vertical scale of the graph shows the percentage of students who answered the pretest question correctly. If the question is measuring the skills it is intended to measure, this percentage will be low for students with lower test scores and high for students with higher test scores.

Figure 1a shows the graph for a question that is easy but effective. This question is difficult for students at the low end of the score scale but is fairly easy for students in the middle. At the higher end of the score scale, nearly all the students answer the question correctly.

Figure 1b shows the graph for a question that is too easy for effective measurement. Even the least proficient students tend to answer this question correctly.

Figure 1c shows the graph for an effective question of medium difficulty. Notice that the percentage of students answering the question correctly rises fairly steadily from the lowest score levels to the highest.

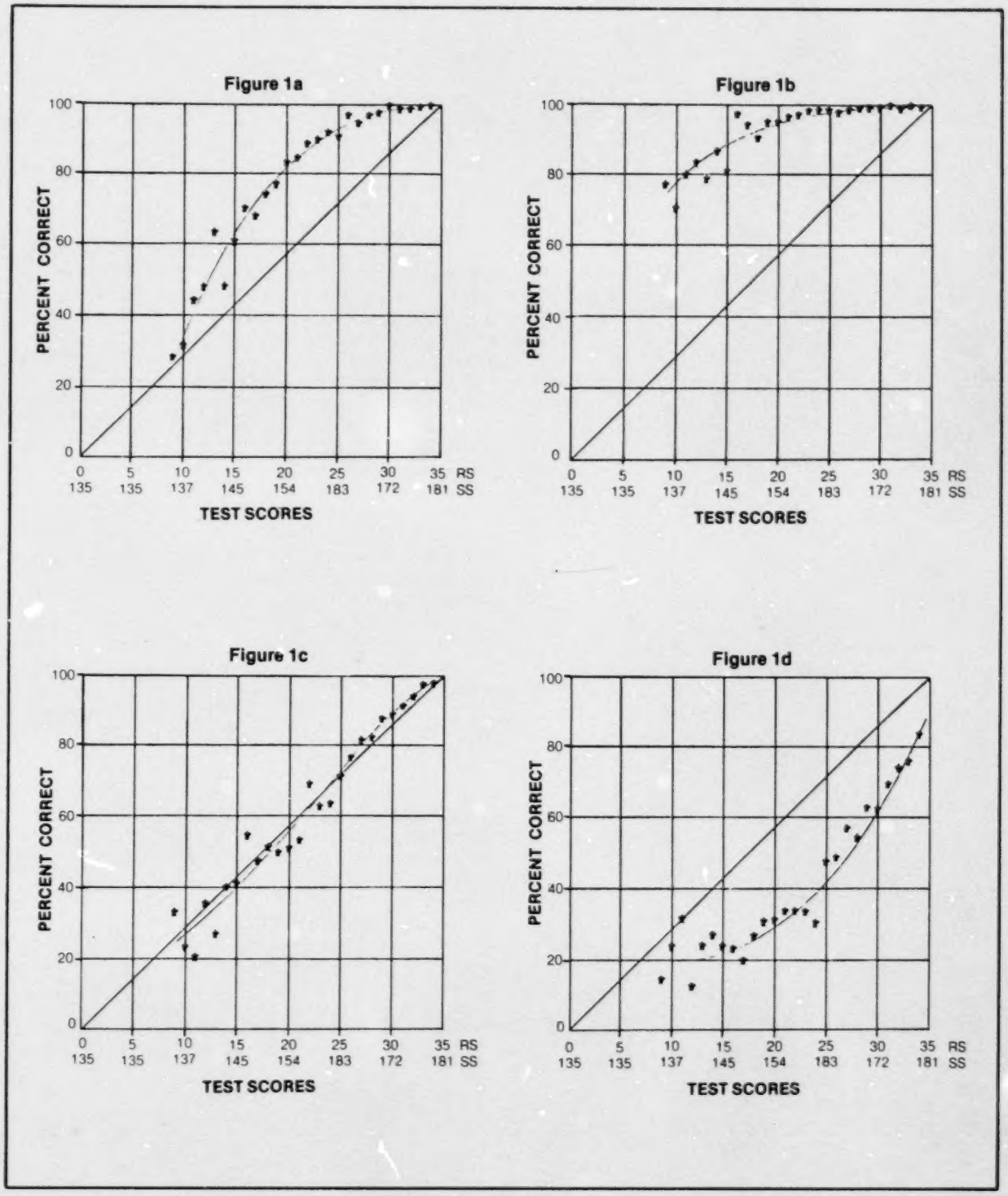
Figure 1d shows the graph for a difficult question. Questions like this one are particularly useful for identifying the most proficient students. Because of its purpose of identifying students in need of remedial help, the NJCBSPT contains relatively few such questions.

Then, after the questions that meet both content and statistical specifications have been selected for each section, the committee reviews the questions again, this time not only to discover problems with individual questions but also to judge whether the relationships between questions in the test are satisfactory. For example, question 14 should not test exactly the same point as question 15, and question 17 should not provide a clue to the answer to question 5. Some questions may be replaced before the review process is completed.

Only after the committee has approved each question for accuracy and for relevance to the purpose of the test is the test ready for printing. When the committee approves a new test form, it has used both the statistical data for each question and the classroom experience and subject matter expertise of its members to make an informed judgment about each of the sections for which it is responsible. The committee's approval indicates that it considers the new section to

Figure 1

Statistical Graphs for Four Pretest Questions
from the Sentence Sense Section of the NJCBSPT



have fair questions dealing with appropriate problems and to be as close as possible in content and in difficulty to similar sections in previous test forms.

THE SCALE USED FOR REPORTING SCORES

Users of the NJCBSPT are advised to rely on scaled scores (standardized scores) rather than raw scores (the number of questions answered correctly) for three important reasons:

1. Because different sections of the test have different numbers of questions, a student's raw scores on the different sections are difficult to compare. For example, is a raw score of 39 on the Reading Comprehension section better than a raw score of 26 on the Sentence Sense section? It is hard to say, because the two sections do not include the same number of questions. Of course *percent* correct could take care of this problem of comparing a student's scores. But comparing percents correct would still not take into account the varying difficulty levels of the sections. Because the NJCBSPT is used to detect the relative strengths and weaknesses a student has in different skill areas, it is crucial to have a way of comparing students' scores from section to section of the test. A common score reporting scale solves this problem.

2. For tests that consist of several sections, such as the NJCBSPT, it is sometimes useful to have composite scores which represent combinations of certain of these section scores. Such composite scores are better indicators of students' abilities in more broadly defined skill areas. Two composite scores are reported for the NJCBSPT: Composition (a combination of scores on Sentence Sense and Essay) and Total English (a combination of Sentence Sense, Essay, and Reading Comprehension). Without a common score reporting scale, it would be difficult to provide meaningful composite scores. Simply summing the raw scores for the various sections in order to obtain a composite score would give more weight to the section with the greatest number of multiple-choice items (Reading Comprehension) and would seriously slight the Essay section, which has a maximum score of 12. The composite scaled scores for the NJCBSPT are defined so that each of the constituent scores has an equal effective weight. The common score reporting scale also permits comparisons between a student's composite score and the specific section scores that are included in the composite.

3. A new form of the NJCBSPT is constructed each year, and the difficulty of the test tends to fluctuate slightly from one form of the test to another. To adjust for these slight differences in difficulty between the various forms, raw scores are converted to scaled scores by a process known as equating. The use of scaled scores rather than raw scores minimizes the chances that a student's score will depend on the particular form of the NJCBSPT that he or she happens to take. Without scaled scores, comparisons of scores from year to year might be misleading because of these fluctuations in difficulty.

The scale used to report NJCBSPT scores is devised to have a mean of 165 and a standard deviation of 10 (based on the students who took the test during Cycles 1 through 6 of 1978). The score scale is truncated at 135 and 195; i.e., any student with a raw score more than three standard deviations from the mean received a scaled score of 135 or 195.

TEST SCORE DISTRIBUTIONS

The distributions of scores on the NJCBSPT are a consequence of the purpose of the test. The NJCBSPT is intended to help identify those students who may most benefit from special assistance in reading, writing, computation, and elementary algebra before enrolling in college-level courses. It is designed to provide the most accurate measurement in the lower portion of the score scale, where placement decisions of this sort are likely to be made. It would be impossible to distinguish between a student of very low proficiency and a student of moderately low proficiency if all the questions on the test were so difficult that neither student could answer them correctly. Therefore, the test must contain several questions easy enough to be answered by students of fairly low proficiency. As a result, the NJCBSPT is much less difficult than many other standardized tests. Because the NJCBSPT is not meant to aid in selecting highly skilled students for special courses or programs, it does not contain the number of difficult questions necessary to discriminate well at higher levels of proficiency.

Figure 2 on page 7 shows a "normal" distribution of test scores having the same mean and standard deviation as NJCBSPT scaled scores. This distribution of scores is appropriate for tests intended to discriminate well at all levels of skills. The scores are spread out as much above the mean as below the mean. In contrast, the NJCBSPT scores (with the exception of Elementary Algebra) have a distribution like that shown in Figure 3.* This distribution is "negatively skewed"; the scores below the mean (165) are much more spread out than the scores above the mean. Such a distribution makes it easier to detect differences in proficiency among students whose skills are below average.

The shape of the NJCBSPT score distributions and the way the score scales are defined tend to limit the range of possible scores. Because the tests are easy, the mean raw score tends to be within two standard deviations of the maximum possible raw score. Since the mean raw score corresponds to a scaled score of approximately 165, the maximum possible raw score tends to be assigned a scaled-score value of 185 or less.** At the other end of the scale, although some students' raw scores are more than three standard deviations below the mean, the range of scaled scores does not extend below 135. Distinctions between scores below this level tend to be neither reliable nor useful.

*The distribution of scores for the Elementary Algebra section is shown on page 9

**The highest possible scaled scores for Form 3EJP are 182 for Reading Comprehension, 181 for Sentence Sense, 188 for Composition and Total English, and 180 for Computation. The maximum scaled scores for subsequent forms are expected to be similar to those for Form 3EJP.

Figure 2

A "Normal" Distribution of Test Scores with a Mean of 165 and a Standard Deviation of 10

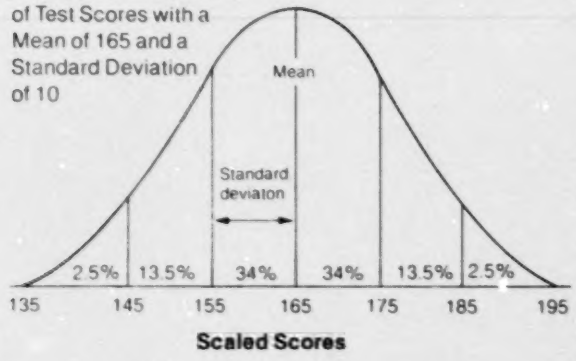
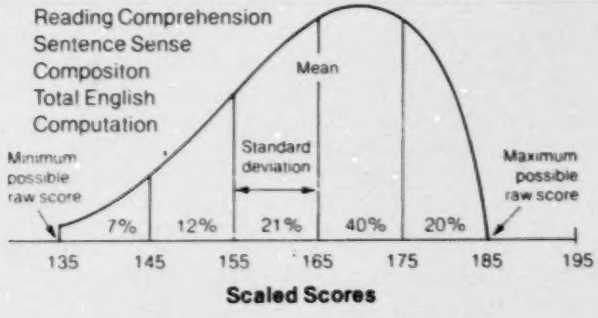


Figure 3

Approximate Distribution of the Following NJCBSPT Scores:

Reading Comprehension
Sentence Sense
Compositon
Total English
Computation



INTERPRETING THE READING AND WRITING SCORES

For each student taking the NJCBSPT, the following reading and writing scores are reported:

A. Reading Comprehension

B. Sentence Sense

C. Essay

D. Composition (composite score based on Sentence Sense and Essay)

E. Total English (composite score based on the three reading and writing sections)

All total and composite scores are reported as scaled scores. The reported Essay score is the sum of the scores given by two independent readers. Off-topic papers and papers with an insufficient sample of writing receive a score of zero. Other papers receive a score within the range of 2 to 12.*

*Prior to the 1980-81 testing year, Essay scores were reported on an 8-point rather than a 12-point scale.

Also reported for the total and composite scores is the local percentile rank based on students tested in the previous testing year. For a particular student, this number represents the percent of scores at the student's institution that were lower than his or her score. The local percentile rank is a convenient way of determining an individual student's relative standing at his or her institution.

Reading Comprehension

The ability to read and understand what one has read is basic to success in any college course. A student's reading ability is thus pertinent to decisions about the student's course of study. The Reading Comprehension section of the NJCBSPT has some sets of questions based on short passages and some discrete questions. Students are asked to identify main ideas, to interpret ideas stated directly in a passage, to draw inferences from the passage, and to recognize relationships between sentences.

Sentence Sense

The good writer has command of sentence structure, of the way elements of a sentence fit together logically in order to convey ideas clearly and effectively. The questions in this part of the test deal with whether the student can identify a complete sentence (according to the traditional definition), with whether the student understands the logical connections needed between parts of a sentence, and with whether the student can recognize flaws that make sentences difficult to interpret or even ridiculous and meaningless. Students are asked about such things as the placement of modifiers in sentences ("After phoning my neighbor, the dog stopped barking."), about coordination and subordination of ideas in sentences ("Mary's apartment is in Camden, and she comes from Detroit."), and about completeness of sentences ("Ralph, who is a teacher and author of a book.").

In one kind of question in the test, students are asked to recognize the error, if there is one, in an underlined part of the sentence and to choose the best way of rephrasing the sentence to correct the problem. In the other kind of question, students are asked to rephrase sentences mentally—changing them, much as one would in rewriting, for emphasis or to give variety—and to choose the version of the rewritten sentence that contains no faults.

Essay

Most New Jersey English teachers believe that no test of writing ability will give an accurate picture of the student's ability to write unless that test gives the student an opportunity to write, to express ideas in his or her own words. The NJCBSPT asks the student to produce a brief writing sample in response to an assigned topic. What is needed for the purpose of this test—the identification of students who need special help—is only a short writing sample that will give some indication of such basic competencies as the ability to organize a paragraph, write a complete sentence, use standard English grammar and punctuation, use appropriate vocabulary, and use specific examples. Such a sample can be produced in the 20 minutes allotted for the writing task.

Before an essay topic is selected for use in the final form of the test, students in New Jersey colleges are asked to write on a variety of pretest topics proposed by the Reading and Writing Advisory Committee. By examining the essays written by these students, the committee determines the suitability of the topic for the test. A suitable topic is one about which all students can be expected to have something to say and one for which they can readily provide specific examples from their own experience.

The essays are scored by New Jersey college and high school faculty, assembled at a central location for the sole purpose of scoring the essays. In their scoring, the teachers are asked to rank papers by comparing them to each other (not to some ideal of professional writing), to reward students for what they have done well rather than penalize them for what they have done poorly, to remember that the essays were written in only 20 minutes under the pressure of taking a test, and to score each essay on the basis of the total impression it creates. The readers judge all aspects of the composition together, from spelling and punctuation to organization and style; they do not award separate scores for separate aspects of writing. Each paper is scored by at least two independent evaluators under carefully controlled conditions. For additional information, see the booklet entitled *Scoring the Essays*.

USING THE READING AND WRITING SCORES

Because the requirements of freshman English courses vary from campus to campus, no particular score can serve as the cutoff score in decisions about whether or not a student needs special help. In interpreting the scores, it is imperative that teachers allow themselves to be guided not only by their experience in teaching students but also by the expectations they have of their particular students, expectations based on familiarity with the capabilities of those students. The Basic Skills Council does suggest, however, that every college, at a minimum, use as one of the criteria for placement, cutoff scores that fall within the "Lacking Proficiency in Some Areas" category established by the Council. (See *Report to the Board of Higher Education on the Basic Skills Proficiencies of Students Entering New Jersey Public Colleges and Universities.*)

The first principle in using the scores, of course, is that the content of the test be relevant to the content of the instruction. Once that relevance has been determined, certain general principles for using the NJCBSPT reading and writing scores can be followed:

1. The Essay score is reported in a different form from the other scores. This form of reporting is deliberate; it is an attempt to call to the interpreter's attention the difference between the multiple-choice scores and the Essay score. The Essay score is based on a student's reaction to *one* topic on *one* occasion. If the student has misinterpreted the topic or misread it or if the topic is one that the student has little or no interest in, his or her score on the Essay is bound to be affected. A single short essay is neither a reliable nor valid placement instrument when it is used by itself. It should be used in conjunction with multiple-choice scores, as provided by the Composition score of the NJCBSPT, or with other samples of the student's writing collected, if at all possible, over a period of time.
2. Certain scores should be used as guidelines: a low Reading Comprehension score (especially in combination with other low scores on the NJCBSPT or other tests), for example, indicates that the student is likely to need help in reading. It would not be amiss to suggest that the student with both a low Reading Comprehension score and a low Composition score cannot write because he or she cannot read. A low Composition score despite a high Reading Comprehension score indicates the need for special help in writing.
3. It is probably best to look at the composite scores (Total English and Composition) before taking into consideration the section scores (Essay, Sentence Sense, Reading Comprehension). If the composite score is high and the score on a multiple-choice section is low, the student may need laboratory work or other individualized instruction to help him or her overcome the particular weakness the test score indicates. If the composite score is high and the essay section score is low, it may be that the student should be asked to provide another sample of his or her writing ability. In no case should the essay, given its limited reliability, be considered the sole criterion for a placement decision.
4. Of course, the best method of making placement decisions is to use the NJCBSPT scores in conjunction with other test scores as well as such information as high school grades, courses completed, and years out of school.

INTERPRETING THE MATHEMATICS SCORES

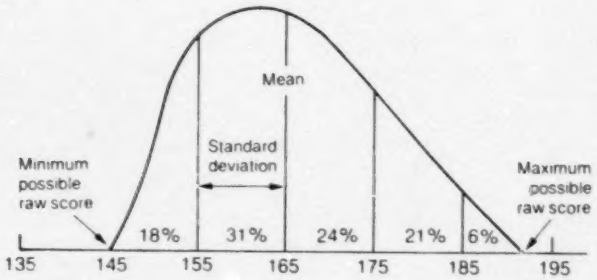
The NJCBSPT contains two mathematics sections that are designed to provide information about a student's skills in computation and elementary algebra. The questions contained in the Computation section measure a student's ability to perform basic arithmetic operations and to solve problems that involve fundamental arithmetic concepts. The questions in the Elementary Algebra section measure the ability to perform basic elementary algebra operations and to solve problems that involve elementary algebra concepts. Each mathematics section consists of 30 multiple-choice questions (plus 5 nonscored questions being pretested for use in future forms). A scaled score and a local percentile rank are reported for each section. In addition, the score report for the NJCBSPT sent to the student's college and high school provides information about the student's responses to every question in the two mathematics sections. A plus sign (+) for a question indicates the question was answered correctly, a zero (0) indicates the question was omitted (not responded to), and a letter (A, B, C, or D) indicates the particular incorrect choice selected by the student.

The Elementary Algebra scores have a distribution similar to the one shown in Figure 4. Unlike the other NJCBSPT scores (including Computation), which tend to cluster in the upper portion of the range of possible scores, the raw scores on the Elementary Algebra test are spread throughout the possible raw score range, somewhat more heavily in

the lower portion.* As a result, the raw-score standard deviation is large. The lowest possible raw score is only about two standard deviations below the mean, and the highest possible raw score is only about two-and-one-half standard deviations above the mean. Since the mean raw score corresponds to a scaled score of approximately 165, the scaled score range for this test extends from about 145 to about 190.** Clearly, most students have more difficulty with the Elementary Algebra section than with other sections of the test.

Figure 4

Approximate Distribution of
NJCBSPT Elementary Algebra Scores



Scaled Scores

The primary purpose of the two mathematics sections is to determine whether a student is prepared to begin certain college-level work without a handicap in computation or elementary algebra. The test scores indicate whether the student would benefit from special instruction or developmental courses in mathematics offered by New Jersey colleges. The particular use of the mathematics score information is the prerogative of each institution. Because mathematics prerequisites and mathematics course offerings vary greatly from college to college and from program to program within each college, no single cutoff score can be established for use at all colleges. However, the Basic Skills Council does suggest that all colleges, at a minimum, set cutoff scores within the "Lacking Proficiency in Some Areas" category established by the Council. (See *Report to the Board of Higher Education on the Basic Skills Proficiencies of Students Entering New Jersey Public Colleges and Universities*.) The mathematics faculty at each institution should review the contents of the Computation and Elementary Algebra tests to ascertain how well students at the college can be expected to perform on each test and how closely the content of the test relates to the content of various mathematics prerequisites or required courses.

The Basic Skills Council suggests that the NJCBSPT mathematics results be used in conjunction with other criteria for placement, such as other test scores and high school background information, including mathematics courses completed and years since last mathematics courses were taken.

For additional information, see *Interpreting Mathematics Scores on the New Jersey College Basic Skills Placement Test*.

RELIABILITY AND THE STANDARD ERROR OF MEASUREMENT

The score a student obtains on any given test on any one occasion is only an approximate measure of the student's skills in the areas measured by the test. If a student took two forms of any of the sections of the NJCBSPT, it is unlikely that he or she would obtain precisely the same score on each, since the sample of questions changes from one test form to another. The extent to which students' scores on a test may be expected to vary from one form of the test to another is expressed by two statistics—the reliability coefficient and the standard error of measurement.

The reliability coefficient can be thought of as the correlation between scores on two parallel or equivalent forms of a test. The Kuder-Richardson Formula 20 (KR-20) estimate of reliability is frequently used in reporting reliabilities. Because this estimate is based on examinee responses to the test questions on *one* form, it is not a direct measure of the stability of test scores across different forms of the test. However, for tests on which speed is not an important factor, KR-20 will closely approximate other, more direct estimates of reliability. For the NJCBSPT, the KR-20 estimate of the reliability of each section is probably an underestimate of the alternate-forms reliability of the section, because any given test form contains some questions that have appeared on past forms of the test and some that will appear on future forms. The KR-20 reliability coefficients for the four multiple-choice section scores of the NJCBSPT (Form 3EJP) are as follows: Reading Comprehension, .89; Sentence Sense, .87; Computation, .91; Elementary Algebra, .92. The reliabilities of the two composite scores are estimated to be in the following ranges: Composition, .83–.92; Total English, .91–.95. No direct estimate of the reliability of the Essay scores is possible because the Essay test consists of only one question.

Another reliability statistic, one that in some ways is more useful than the reliability coefficient, is the standard error of measurement (SEM). This statistic is a measure of the form-to-form variation in the test scores of a student or a group of students. If a student could somehow take all possible forms of a test, the result would be a distribution of scores. The mean of this distribution is called the student's "true score." The standard deviation of this distribution is the standard error of measurement for that student. Therefore, the standard error of measurement indicates the extent to which a student's score is likely to depend on the particular selection of questions on the form of the test the student took.

Colleges should consider the imprecision of a student's test score as an indicator of the student's skills when placing students into courses on the basis of their scores. The standard error of measurement provides a measure of that imprecision. Standard errors of measurement permit the

*More than 10 percent of the students who take the NJCBSPT do not even attempt the Elementary Algebra section and, consequently, are not included in the score distribution.

**On Form 3EJP, the range of scaled scores for the Elementary Algebra section was 146 to 189.

test user to assign "tolerances" of a certain number of score points to any observed score. In a large group of students, approximately two-thirds of the students will have obtained scores within one SEM of their true scores. Approximately 95 percent will have obtained scores within two SEMs of their true scores. Interpreting the test score in terms of a score range is a safeguard against treating a score as more precise than it really is.

The raw-score standard error of measurement for a student having a specified true score can be estimated from the formula

$$\sqrt{t(m-t)/m},$$

where t is the student's true *raw* score and m is the maximum possible *raw* score (i.e., the number of questions on the test). This estimate can then be converted to scaled-score terms, by multiplying the number of scaled-score points that correspond to an increase of one raw-score point.

The scaled-score standard error of measurement for a typical student taking each of the four multiple-choice sections of the NJCBSPT is as follows: Reading Comprehension, 4.2; Sentence Sense, 4.0; Computation, 3.1; Elementary Algebra, 3.1. The standard errors of measurement for the two composite scores are estimated to be in the following ranges: Composition, 3.1–4.6; Total English, 2.7–3.6.

SELECTED REFERENCES ON USING PLACEMENT TEST SCORES

Developing appropriate placement standards and implementing a placement program is a complex process. It is beyond the scope of this brief guide to give a full treatment of the extensive subject of college placement. A number of references, however, may serve as excellent overviews. The following sources, briefly annotated, are recommended:

Warren Willingham, *College Placement and Exemption*.
New York: The College Board, 1974.
This book develops a framework for dealing with the most important aspects of placement. It discusses a number of closely related placement models, describes the rationale and technical characteristics of the models, and reviews the relevant literature.

Lawrence M. Aleamoni, with contribution by Joseph W. Dougherty, *Methods of Implementing College Placement and Exemption Programs*.
New York: The College Board, 1979.
This book presents the more practical aspects of developing and implementing college placement programs. It is a natural supplement to Willingham's work listed above.

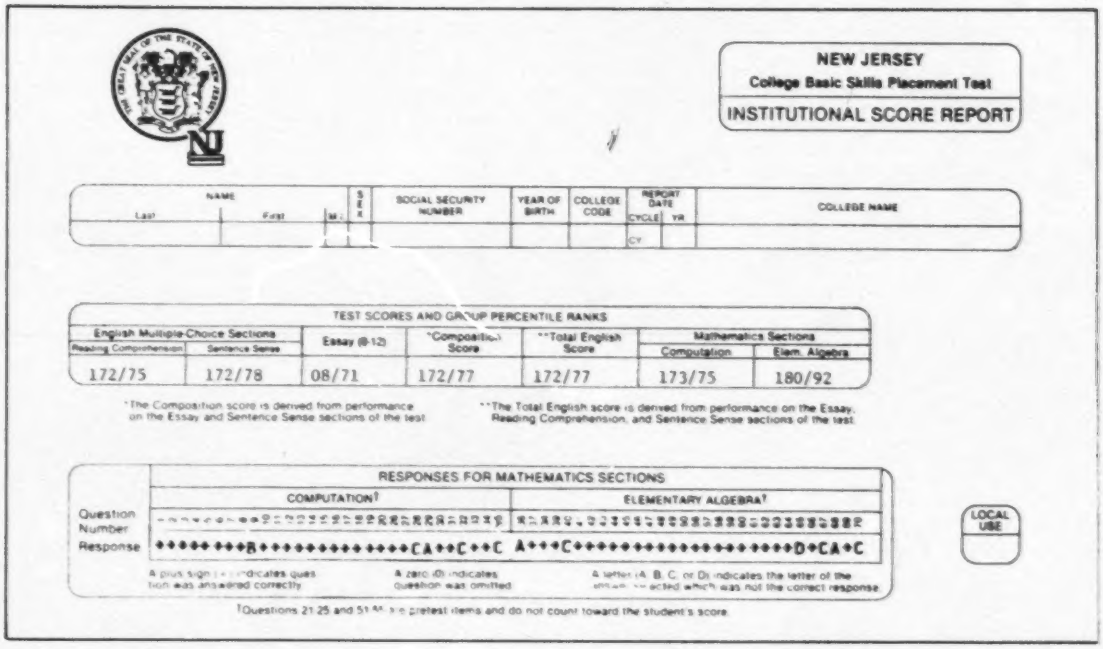
Guide to the Use of the Descriptive Tests of Language Skills.
New York: The College Board, 1978.

Guide to the Use of the Descriptive Tests of Mathematics Skills.
New York: The College Board, 1979.
These two interpretive guides provide a good discussion of how test scores can be used for placement into developmental and regular college courses. These guides may be especially helpful to users of NJCBSPT scores, because the content and purpose of many of the Descriptive Tests of Language Skills and the Descriptive Tests of Mathematics Skills are quite similar to the content and purpose of the NJCBSPT.

Samuel A. Livingston and Michael J. Zieky, *Passing Scores*.
Princeton: Educational Testing Service, 1982.
This guide describes in detail some methods for setting standards based on different kinds of judgments.

SAMPLE SCORE REPORTS

On the following pages are presented six sample score reports. For each score report, a brief interpretation of how the student's obtained scores might be used to place him or her appropriately is also given.



NEW JERSEY
College Basic Skills Placement Test
INSTITUTIONAL SCORE REPORT

NAME Last	First	M.I.	SEX	SOCIAL SECURITY NUMBER	YEAR OF BIRTH	COLLEGE CODE	REPORT DATE CYCLE	YR	COLLEGE NAME
							CY		

TEST SCORES AND GROUP PERCENTILE RANKS

English Multiple-Choice Sections		Essay (0-12)	*Composition Score	**Total English Score	Mathematics Sections	
Reading Comprehension	Sentence Sense				Computation	Elem. Algebra
172/75	172/78	08/71	172/77	172/77	173/75	180/92

*The Composition score is derived from performance on the Essay and Sentence Sense sections of the test.

**The Total English score is derived from performance on the Essay, Reading Comprehension, and Sentence Sense sections of the test.

RESPONSES FOR MATHEMATICS SECTIONS

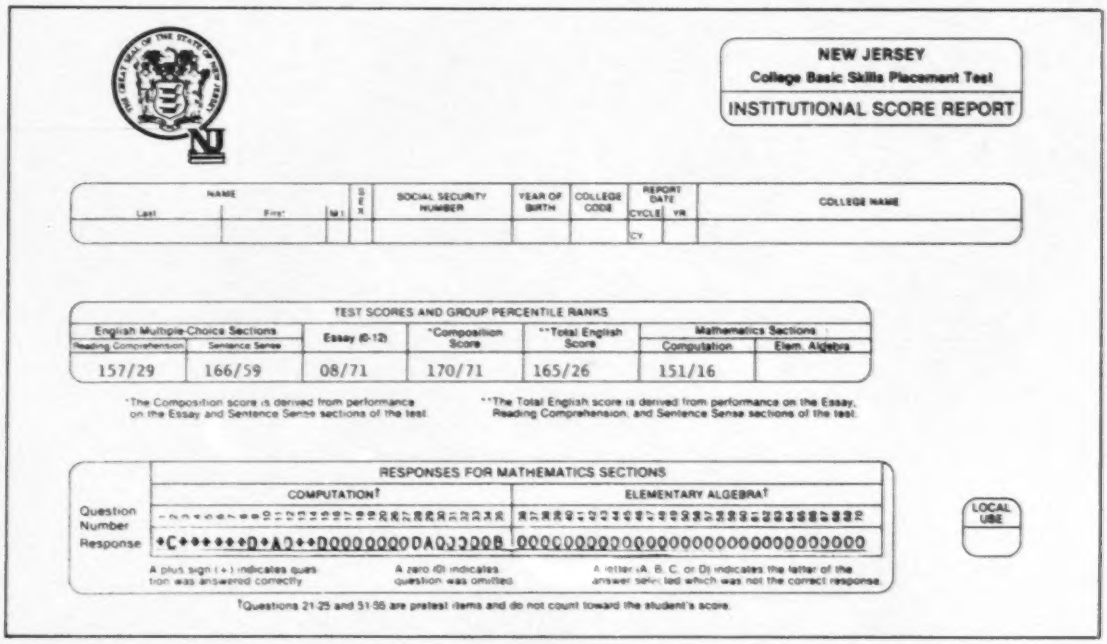
Question Number	COMPUTATION†	ELEMENTARY ALGEBRA†
Response	♦♦♦♦♦♦♦♦B♦♦♦♦♦♦♦♦♦♦♦♦♦♦CA♦♦C♦♦C	A♦♦♦C♦♦♦♦♦♦♦♦♦♦♦♦♦♦♦♦♦♦♦♦D♦CA♦C

A plus sign (+) indicates question was answered correctly. A zero (0) indicates question was omitted. A letter (A, B, C, or D) indicates the letter of the answer selected which was not the correct response.

LOCAL USE

†Questions 21-25 and 51-55 are pretest items and do not count toward the student's score.

Test results indicate that this student is prepared to enter freshman courses in English and is proficient in computation and elementary algebra. Further testing may be appropriate to determine proper placement in courses beyond elementary algebra.



NEW JERSEY
College Basic Skills Placement Test
INSTITUTIONAL SCORE REPORT

NAME Last	First	M.I.	SEX	SOCIAL SECURITY NUMBER	YEAR OF BIRTH	COLLEGE CODE	REPORT DATE CYCLE	YR	COLLEGE NAME
							CY		

TEST SCORES AND GROUP PERCENTILE RANKS

English Multiple-Choice Sections		Essay (0-12)	*Composition Score	**Total English Score	Mathematics Sections	
Reading Comprehension	Sentence Sense				Computation	Elem. Algebra
157/29	166/59	08/71	170/71	165/26	151/16	

*The Composition score is derived from performance on the Essay and Sentence Sense sections of the test.

**The Total English score is derived from performance on the Essay, Reading Comprehension, and Sentence Sense sections of the test.

RESPONSES FOR MATHEMATICS SECTIONS

Question Number	COMPUTATION†	ELEMENTARY ALGEBRA†
Response	♦C♦♦♦♦♦D♦AD♦♦DQQQQQQQDAQJQQQB	QQQQQQQQQQQQQQQQQQQQQQQQQQQQQQ

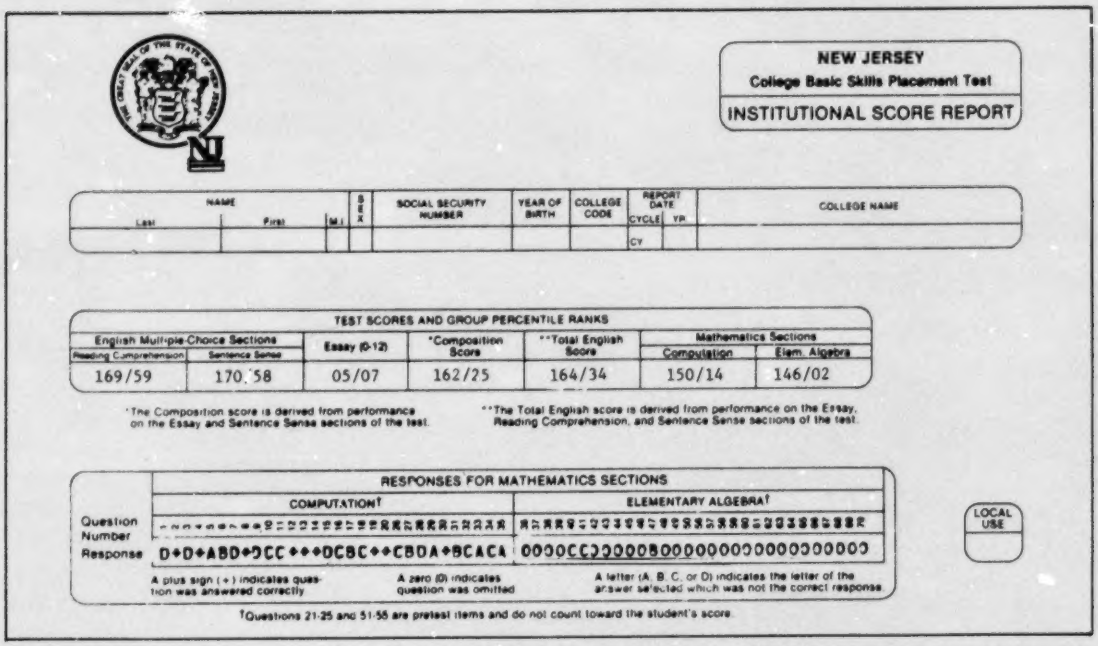
A plus sign (+) indicates question was answered correctly. A zero (0) indicates question was omitted. A letter (A, B, C, or D) indicates the letter of the answer selected which was not the correct response.

LOCAL USE

†Questions 21-25 and 51-55 are pretest items and do not count toward the student's score.

This student has performed satisfactorily on all language parts of the test except Reading Comprehension. The student can probably be assigned to regular classes, but he or she should be encouraged to seek special help in reading from the tutoring laboratory or in an individualized instructional program.

This student's Computation score indicates a need for instruction in arithmetic before entering an elementary algebra course. The student did not take the Elementary Algebra section of the test.



NEW JERSEY
College Basic Skills Placement Test
INSTITUTIONAL SCORE REPORT

NAME Last	First	M.I.	SEX	SOCIAL SECURITY NUMBER	YEAR OF BIRTH	COLLEGE CODE	REPORT DATE CYCLE	YR	COLLEGE NAME
							CY		

TEST SCORES AND GROUP PERCENTILE RANKS

English Multiple-Choice Sections		Essay (0-12)	*Composition Score	**Total English Score	Mathematics Sections	
Reading Comprehension	Sentence Sense				Computation	Elem. Algebra
169/59	170/58	05/07	162/25	164/34	150/14	146/02

*The Composition score is derived from performance on the Essay and Sentence Sense sections of the test.

**The Total English score is derived from performance on the Essay, Reading Comprehension, and Sentence Sense sections of the test.

RESPONSES FOR MATHEMATICS SECTIONS

Question Number	COMPUTATION†	ELEMENTARY ALGEBRA†
Response	D+D+ABD+DCC+++DCBC++CBDA+BCACA	0000CC0000B000000000000000000

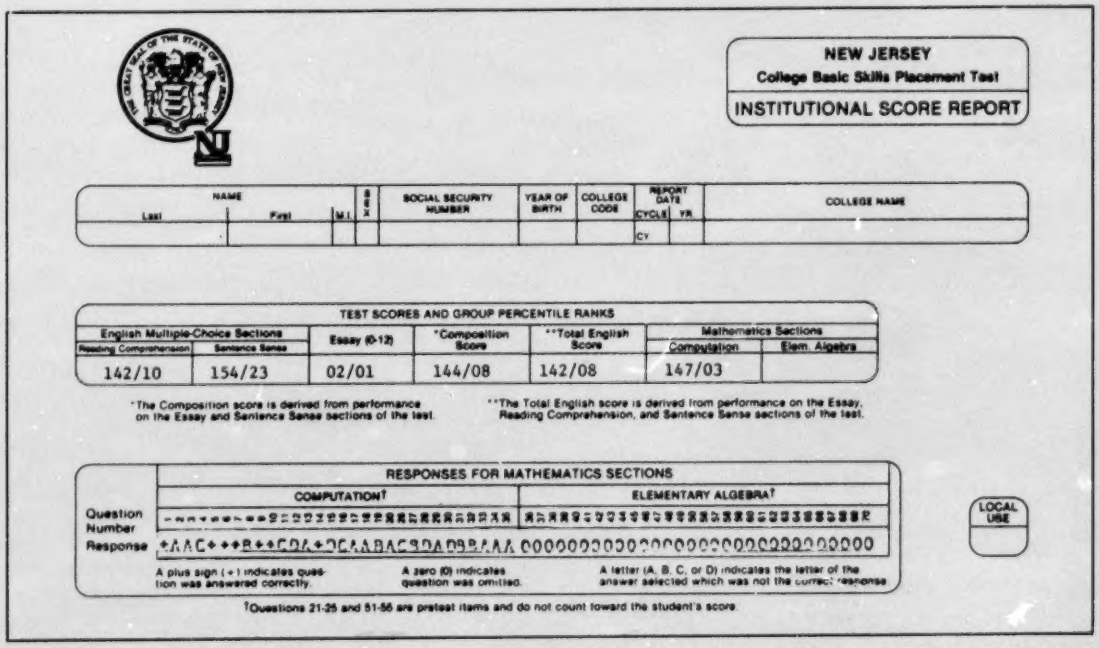
A plus sign (+) indicates question was answered correctly. A zero (0) indicates question was omitted. A letter (A, B, C, or D) indicates the letter of the answer selected which was not the correct response.

LOCAL USE

†Questions 21-25 and 51-55 are pretest items and do not count toward the student's score.

Adequate Reading Comprehension and Sentence Sense scores may suggest that the relatively low Essay score is not a good indication of the student's writing ability. The low Essay score accounts for the low Composition and Total English scores. Therefore, it may be appropriate to give the student an opportunity to write another essay on a different essay topic.

In mathematics, the student should begin with a remedial course in arithmetic.



NEW JERSEY
College Basic Skills Placement Test
INSTITUTIONAL SCORE REPORT

NAME Last	First	M.I.	SEX	SOCIAL SECURITY NUMBER	YEAR OF BIRTH	COLLEGE CODE	REPORT DATE CYCLE	YR	COLLEGE NAME
							CY		

TEST SCORES AND GROUP PERCENTILE RANKS

English Multiple-Choice Sections		Essay (0-12)	*Composition Score	**Total English Score	Mathematics Sections	
Reading Comprehension	Sentence Sense				Computation	Elem. Algebra
142/10	154/23	02/01	144/08	142/08	147/03	

*The Composition score is derived from performance on the Essay and Sentence Sense sections of the test.

**The Total English score is derived from performance on the Essay, Reading Comprehension, and Sentence Sense sections of the test.

RESPONSES FOR MATHEMATICS SECTIONS

Question Number	COMPUTATION†	ELEMENTARY ALGEBRA†
Response	+AAC+++B++CDA+DCAABACBDADBBAAA	0000000000000000000000000000000

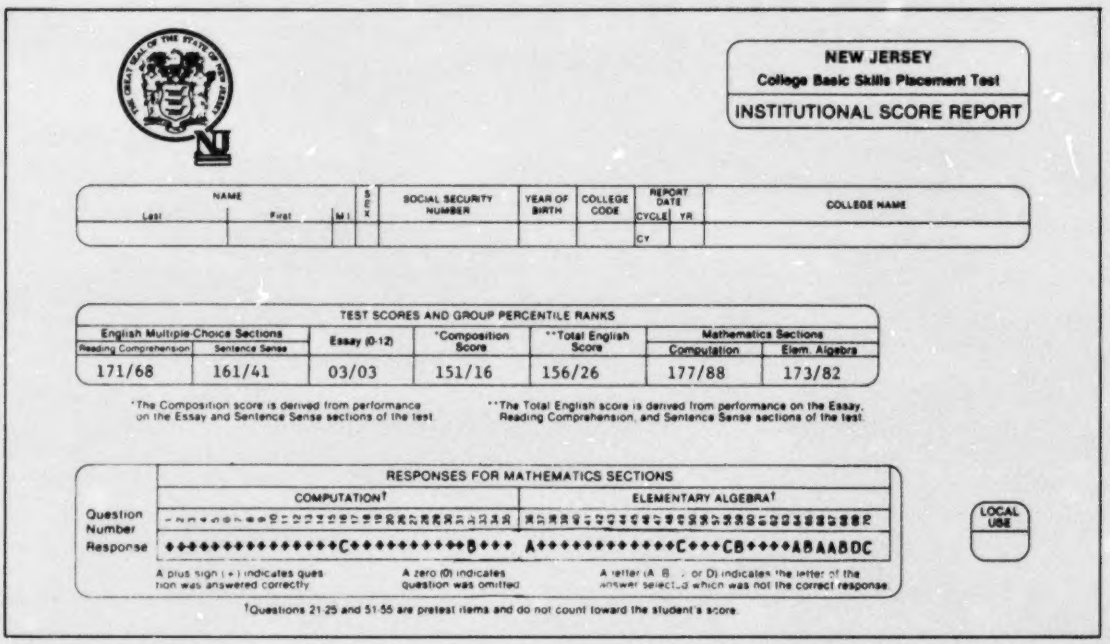
A plus sign (+) indicates question was answered correctly. A zero (0) indicates question was omitted. A letter (A, B, C, or D) indicates the letter of the answer selected which was not the correct response.

LOCAL USE

†Questions 21-25 and 51-55 are pretest items and do not count toward the student's score.

All the student's reading and writing scores are low. This student should probably have intensive instruction in reading and writing.

Help in mathematics should begin with elementary arithmetic. This student did not take the Elementary Algebra section.



NEW JERSEY
College Basic Skills Placement Test
INSTITUTIONAL SCORE REPORT

NAME Last	First	MI	SEX	SOCIAL SECURITY NUMBER	YEAR OF BIRTH	COLLEGE CODE	REPORT DATE CYCLE	YR	COLLEGE NAME
							CY		

TEST SCORES AND GROUP PERCENTILE RANKS

English Multiple-Choice Sections		Essay (0-12)	*Composition Score	**Total English Score	Mathematics Sections	
Reading Comprehension	Sentence Sense				Computation	Elem. Algebra
171/68	161/41	03/03	151/16	156/26	177/88	173/82

*The Composition score is derived from performance on the Essay and Sentence Sense sections of the test.

**The Total English score is derived from performance on the Essay, Reading Comprehension, and Sentence Sense sections of the test.

RESPONSES FOR MATHEMATICS SECTIONS

Question Number	COMPUTATION†	ELEMENTARY ALGEBRA†
Response	♦♦♦♦♦♦♦♦♦♦♦♦♦♦C♦♦♦♦♦♦♦♦♦♦B♦♦♦	A♦♦♦♦♦♦♦♦♦♦♦♦♦C♦♦♦CB♦♦♦♦ABAABDC

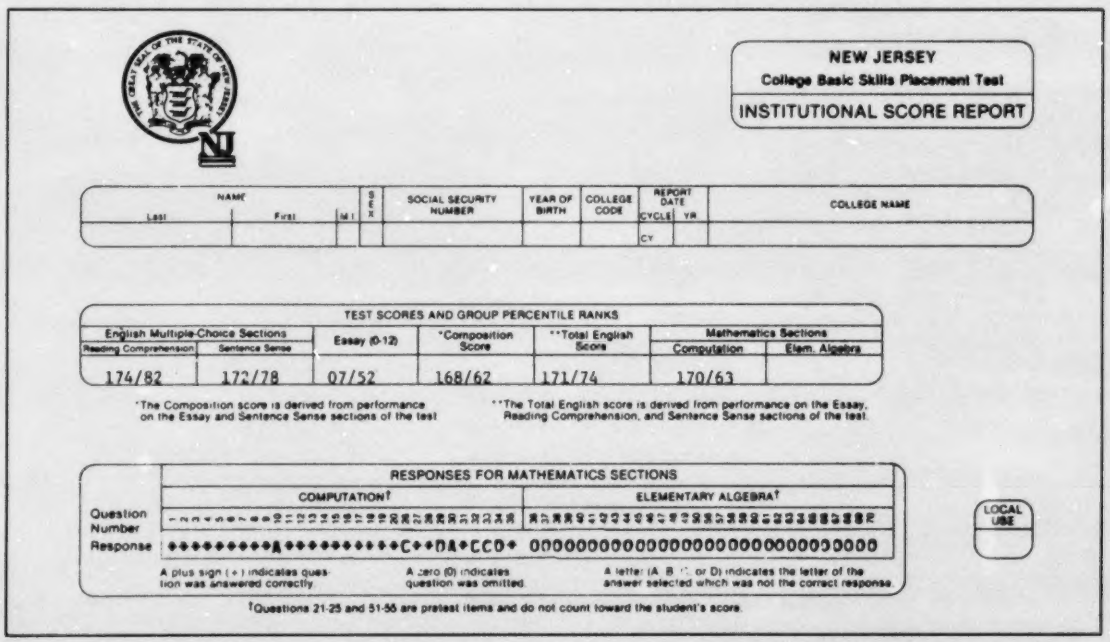
LOCAL USE

A plus sign (+) indicates question was answered correctly. A zero (0) indicates question was omitted. A letter (A, B, C, or D) indicates the letter of the answer selected which was not the correct response.

†Questions 21-25 and 51-55 are pretest items and do not count toward the student's score.

Despite an adequate score in Reading Comprehension, the student has a Composition score that indicates a probable need for remedial help in writing. The student has failed to perform satisfactorily on all parts of the test dealing with writing.

For mathematics, the student's high school transcript should be reviewed to determine an appropriate mathematics course. A more advanced mathematics test could also be used to indicate an appropriate entry point in the institution's mathematics curriculum.



NEW JERSEY
College Basic Skills Placement Test
INSTITUTIONAL SCORE REPORT

NAME Last	First	MI	SEX	SOCIAL SECURITY NUMBER	YEAR OF BIRTH	COLLEGE CODE	REPORT DATE CYCLE	YR	COLLEGE NAME
							CY		

TEST SCORES AND GROUP PERCENTILE RANKS

English Multiple-Choice Sections		Essay (0-12)	*Composition Score	**Total English Score	Mathematics Sections	
Reading Comprehension	Sentence Sense				Computation	Elem. Algebra
174/82	172/78	07/52	168/62	171/74	170/63	

*The Composition score is derived from performance on the Essay and Sentence Sense sections of the test.

**The Total English score is derived from performance on the Essay, Reading Comprehension, and Sentence Sense sections of the test.

RESPONSES FOR MATHEMATICS SECTIONS

Question Number	COMPUTATION†	ELEMENTARY ALGEBRA†
Response	♦♦♦♦♦♦♦♦♦A♦♦♦♦♦♦♦♦♦♦C♦♦DA♦CCD♦	0000000000000000000000000000

LOCAL USE

A plus sign (+) indicates question was answered correctly. A zero (0) indicates question was omitted. A letter (A, B, C, or D) indicates the letter of the answer selected which was not the correct response.

†Questions 21-25 and 51-55 are pretest items and do not count toward the student's score.

Despite the average score on the Essay, the student has performed extremely well on all other parts of the reading and writing tests. Remedial work is not indicated.

The absence of an Elementary Algebra score indicates that the student did not take this section of the test. He or she should probably begin with an elementary algebra course, as proficiency in simple computation has adequately been demonstrated.